

CALIFORNIA HOUSEHOLD SUBSTANCE USE SURVEY (CAHSUS)

SUMMARY REPORT

State of California
Gray Davis, Governor

Health and Human Services Agency
Grantland Johnson, Secretary

Department of Alcohol and Drug Programs
Office of Applied Research and Analysis

Western Consortium for Public Health



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HOUSEHOLD SUBSTANCE USE SURVEY
(CAHSUS)
SUMMARY REPORT

Based on Executive Summary
By Western Consortium for Public Health
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Prepared for California Department of Alcohol and Drug Programs
With Funding by Substance Abuse and Mental Health Services Administration,
Center for Substance Abuse Treatment

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State of California, Health and Human Services Agency
Department of Alcohol and Drug Programs
Office of Applied Research and Analysis

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CALIFORNIA HOUSEHOLD SUBSTANCE USE SURVEY (CAHSUS)

HIGHLIGHTS

BACKGROUND

California Household Substance Use Survey (CAHSUS) was the first ever statewide survey of alcohol and other drug use and treatment need among adults in California. This telephone survey was conducted by Western Consortium for Public Health under contract to the Department of Alcohol and Drug Programs, with funding from Substance Abuse and Mental Health Services Administration, Center for Substance Abuse Treatment (CSAT). Technical assistance was provided by the National Technical Center for Substance Abuse Needs Assessment (NTC) at the Harvard School of Medicine.

The purpose of the survey was to provide estimates of the prevalence of substance use and use disorders among adults, aged 18 years and older, and to apply the findings to the population to estimate the numbers of people potentially in need of some intervention in their alcohol and/or drug use.

DESIGN AND METHODOLOGY

The CAHSUS instrument included a comprehensive battery of questions covering AOD use and treatment, general health, and mental health. The core consisted primarily of questions adapted from the Diagnostic Interview Schedule (DIS) which is derived from the American Psychiatric Association's *Diagnostic and Statistical Manual of Mental Disorders, 3rd revised edition* (DSM III-R) which contains criteria for diagnosing alcohol and drug dependence and abuse.

The study used a probability sample stratified to obtain data for the following crucial subpopulations: (a) six state regions; (b) two poverty levels; (c) four age-groups; (d) four ethnic groups.

CAHSUS obtained a sample of 5,555. Data were gathered by conducting a random digit dial telephone survey of households with telephones during the period between August 1995 and January 1996.

MAJOR FINDINGS

- ! *Alcohol* was the most widely used substance in all strata of the sample, with 75% reporting drinking in the past 12 months, and 56% in the past 30 days.
- ! *Marijuana* was second in frequency of consumption, with past 12-month use of 11.1% and past 30-day use of 5.5%.
- ! Respondents' reported lifetime rates of *marijuana and tobacco* use were about the same: almost 45%. Among young adults *aged 18-24 years*, lifetime marijuana use was significantly higher than lifetime tobacco use (50% vs. 34% for males and 42% vs. 24% for females).
- ! *Past 12-month use of other illicit drugs* was much less frequent: 1.9% for cocaine, 1.6% for amphetamines, 1.4% for hallucinogens and 0.3% for opiates.
- ! *Men's* lifetime and past-12-month rates of substance use were higher than *women's* in all age, poverty level, race/ethnic, and geographic group comparisons, except the 18-24 year old age group in which no significant differences in opiate use were found.
- ! Respondents *aged 18-24* had higher *past-12-month* rates of *illicit drug use* than all other age groups. Alcohol use was similar to other age groups.
- ! Respondents *above 200% of the poverty level* had significantly higher rates of alcohol consumption than those below 200% of the poverty level.
- ! Comparisons of the six study *regions* found the use of alcohol and any other drugs was significantly higher in the Bay Area than in the other regions.
- ! An assessment of problem use in the past 12 months yielded two rates of adults in *need of some type of intervention*: using the stricter DSM-III-R definition-- 4.8%; using the NTC definition--8.0%. These proportions may be viewed as the boundaries of the range of adults in need of some type of intervention.
- ! Three percent of respondents reported ever having been in a formal alcohol or drug treatment program, while 6.0% have been in a 12-step program at some time in their lives.

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BACKGROUND

This report is a summary of the *California Household Substance Use Survey (CAHSUS): Technical Report* prepared by The Western Consortium for Public Health (WCPH) for the California Department of Alcohol and Drug Programs (CDADP), with funding by the Substance Abuse and Mental Health Services Administration, Center for Substance Abuse Treatment (CSAT). It was authored by Sue Holtby, Jane Witbrodt, and Elaine Zahnd (February 1997). Please refer to the *Technical Report* for a more complete description of the CAHSUS methodology and for more detailed findings.

The California Household Substance Use Survey (CAHSUS) was the first ever statewide comprehensive survey of alcohol and other drug use and treatment need among California adults. Its purpose was to provide data on substance use problems among California residents aged 18 years and older, focusing on the following areas:

- estimate the prevalence of alcohol and other drug use;
- estimate the prevalence of substance use disorders;
- apply the estimates of substance use problems to the population to estimate the numbers of persons potentially in need of some intervention in their alcohol and/or drug use.

METHODS

Sample

CAHSUS used a stratified random sample of households with telephones in the state. The household sample was selected using the Random Digit Dialing process which makes it possible for those with unlisted telephone numbers to be included. A total of 5,555 English and Spanish speaking adults were interviewed during the period between August 1995 and January 1996. Within each household, the person with the most recent birthday was selected to be interviewed. The sample did not include individuals who were institutionalized.

To insure that the sample adequately represented groups crucial to the study, it was stratified by region, poverty level, and age groups in a step-wise manner. The targeted number of households in each sample stratum was based on their proportion in the 1990 census, except for groups which would be too small for reliable estimates. Such groups were oversampled--i.e., a greater proportion than their proportion in the state's population was targeted and randomly selected.¹

Regions (6). The study sample was first divided into six regions. Each region consisted of aggregates of counties, with the exception of Los Angeles County, which was a single-county region because of its size. The counties in each region are listed below and are also shown in Figure 1:

- ℄ *Bay Area* - Marin, San Francisco, San Mateo, Alameda, and Contra Costa counties;
- ℄ *Los Angeles County*;
- ℄ *South-Eastern Region* - Mono, Inyo, Riverside, San Bernardino, Orange, Imperial, and San Diego counties;
- ℄ *Mid-Central Region* - Santa Clara, Santa Cruz, Monterey, San Benito, San Luis Obispo, Fresno, Kern, Madera, Mariposa, Kings, Tulare, Santa Barbara, and Ventura counties;
- ℄ *Northern Region* - Del Norte, Siskiyou, Modoc, Humboldt, Trinity, Shasta, Lassen, Mendocino, Tehama, Plumas, Glenn, Butte, Lake, and Colusa counties;
- ℄ *North-Central Region* - Sonoma, Napa, Solano, Yolo, Sacramento, Sutter, Yuba, Sierra, Nevada, El Dorado, Placer, Alpine, Amador, Calaveras, San Joaquin, Tuolumne, Stanislaus, and Merced counties.

Poverty Level (2). Within each region, the sample was divided into two subsamples using the federal poverty levels, based on 1994 household incomes:

- ℄ respondents residing in a household with an income *equal to or below* 200% of the federal poverty level (50%);
- ℄ respondents residing in a household with an income *above* 200% of the federal poverty level (50%).

By selecting a sample with 50% of the households at or below the poverty level (as defined), the study over sampled that sub-population because, according to the 1990 census, individuals in households at or below the poverty level made up only 30.4% of the state's population. This over sampling was required to obtain sufficiently large numbers for detailed analyses of this group which constitutes the vast majority of the state's public treatment clients.

Age Groups (4). Within each poverty level, the sample was further divided into the following age groups:

- 18 to 24
- 25 to 44
- 45 to 64
- 65 and older

The sample was not stratified for ethnic groups because it was expected that the random sample would produce a representative number. However, in order to provide sample sizes large enough to conduct analyses with reliable findings, four demographic groups were over sampled: Latinos above the poverty threshold; African Americans; persons between the ages of 18 and 24 years; and residents of the rural northern part of the state.

Instrument

The survey instrument consisted of a comprehensive battery of questions covering AOD use and treatment, general health, and mental health. The core questions which were adapted from the National Institute of Mental Health's *Diagnostic Interview Schedule* (DIS)² included detailed queries regarding use of alcohol, marijuana, cocaine, amphetamines, hallucinogens, and opiates/opioids. The instrument also contained standardized demographic questions on treatment history developed for CSAT by the National Technical Center for Substance Abuse Needs Assessment (NTC). California specific questions were added on general health, emotional health, neighborhoods, attitudes toward alcohol and drug treatment and barriers to treatment.

As recommended by NTC, the DIS was used, to develop a diagnosis of substance use problems. The DIS is a series of questions derived from the *nine* American Psychiatric Association's Diagnostic and Statistical Manual III-R (DSM III-R) criteria for diagnosing lifetime substance use disorders in a clinical setting. Respondents, with some current year use, who met three or more of the nine DSM III-R symptom criteria, and who met criteria associated with the duration of the symptoms were determined to have a *lifetime substance use disorder*. Those who met the same symptom and duration criteria for the past 12 months were considered to have a *current alcohol and/or other drug problem* and to be in need of treatment or some other intervention. Current problem rates were also calculated using the broader definition recommended by the National Technical Center: those with a lifetime diagnosis who used the problem substance in the past 12 months, and had at least one problem associated with that use.

Analyses

For each specific type of the analyses, the data were weighted, as required, to adjust the data to the state's population (at the 1990 census). For example, because a greater proportion of women were sampled than is found in the population, when data combining men and women were analyzed, women's data was given proportionately less weight and men's data was given proportionately greater weight. However, no weighting was done on analyses which examined women's and men's data separately.³

MAJOR FINDINGS

Substance Use

- ! *Alcohol* was the most widely used substance in all strata of the sample, with 75% reporting drinking in the past 12 months, and 56% in the past 30 days. (Figure 2)
- ! *Marijuana* was second in frequency of consumption, with past 12-month use of 11.1% and past 30-day use of 5.5%. (Figure 2)
- ! It is worth noting that respondents' reported lifetime rates of *marijuana and tobacco* use was essentially the same at almost 45%. Use in the past 30 days differed, with 22% smoking cigarettes and 5.5% smoking marijuana during that period. (Figure 2)
- ! Among young adults *aged 18-24 years*, *lifetime marijuana* use was significantly higher than lifetime tobacco use (50% vs. 34% for males and 42% vs. 24% for females). (Figure 4)
- ! Respondents *aged 18-24* had *past-12-month rates of alcohol use* which were comparable to that of other ages, but had higher rates of *illicit drug use* than all other age groups. (Figure 4; females not charted)
- ! *Past-12-month use of illicit drugs other than marijuana* was much less frequent: 1.9% for cocaine, 1.6% for amphetamines, 1.4% for hallucinogens, and 0.3% for opiates. (Figure 2)
- ! *Men's* lifetime and past-12-month rates of substance use were higher than *women's* in all age, poverty level, ethnic, and geographic group comparisons, except the 18-24 year old age group where no significant differences in opiate use were found. (Figures 3 and 7; past 12-month rates not charted)
- ! Respondents *above 200% of the poverty level* had significantly higher rates of alcohol consumption than those below 200% of the poverty level, and the difference in rates was most pronounced for the past-12-month (79% vs. 65%) and past-30-day periods and (62% vs. 45%). (Figure 5)

- ! *Ethnic-group differences* in past 30-day use varied by substance: *Whites* were found to have higher rates of alcohol consumption than African Americans and Latinos; although low (at 1.5%), rates of cocaine use were higher among *Latinos* than all other groups; and rates of marijuana use (at 8.3%) were higher among *African Americans* than among the other groups. (Figure 8)
- ! Comparisons of the six study *regions* found the Bay Area to have statistically significant higher use-rates of alcohol, (although only slightly higher) and higher use-rates of any illicit drugs than the other five regions. (Figure 9)

Substance Use Disorders

- ! More than 12% of the sample met the DSM-III-R criteria for a *lifetime substance use disorder*.⁴ (Figure 10)
- ! Of those with a lifetime substance use disorder, 78% were for *alcohol only*.⁵ Thus, alcohol remains the most problematic substance in the general population of adults in California. (Figure 10)
- ! Only 1% of respondents meet the DSM-III-R criteria for a lifetime disorder involving *other drug use only*, and 1.7% meet the criteria for a lifetime disorder involving *both alcohol and other drug use* problems. (Figure 10)

Estimates of Treatment Need

- ! An assessment of problem use in the past 12 months yielded two rates of adults in *need of some type of intervention*: using the stricter DSM-III-R definition it is 4.8% while using the NTC definition it is 8.0%. These proportions may be viewed as the boundaries of the range of adults in need of some type of intervention. The discussion of substance use problems or need for treatment presented below uses the NTC definition.
- ! *Men* were found to have significantly higher rates of substance use problems, or need for treatment, than *women*--12.3% versus 4.0%, respectively.

- ! *The 18-24 year old age group* was found to have more problem use than any other age group (16.4%) and each subsequent age group had a lower rate, an indication that, among adults, problem use diminishes with age (25-44, 8%; 45-64, 3.4%; .65, .5%).
- ! Treatment need among *regions* varied from 8.5% in the Mid-Central and Los Angeles regions to 6.7% in the North-Central region.
- ! Statewide, there were no *significant differences* between the two *poverty levels* in the proportion needing treatment. Among the study regions, a significant difference between poverty levels was found only in the Mid-Central region, where the poor were found to have a greater need for treatment than the non-poor (11.0% vs. 7.2%).
- ! Ethnic group comparisons found the *African-American group* to have the lowest rate of *substance use problems*, or need for treatment, among the three main ethnic groups. This was due to lower levels of alcohol-only problems (at 3.2% vs. 5.6% for whites and 6.5% for Latinos).

Treatment Experience

- ! Only 3% of respondents reported ever having been in a *formal alcohol or drug treatment program* in their lives, and less than 1%, reported past 12-month participation.
- ! However, 6.0% have been in a *12-step program* at some time in their lives, and 2.2% have gone to 12-step meetings in the past 12 months.
- ! Only .01% (six) of the 5555 respondents said they tried to get treatment but couldn't in the past 12 months, and only .04% (twenty-three) said they thought they needed treatment in the past 12 months.

Cessation

- ! About 10% of the sample stated they had had a problem with alcohol and/or other drugs in their lifetime, but reported *no related problems in the past 12 months*. This group included respondents who abstained, those who used the once-problem substance, and/or those who used other substances.
- ! Among those who *currently abstain* from the once-problem substance, more than half quit on their own, and another third quit through participation in 12-step programs that were not part of formal treatment. One-tenth quit through a formal treatment program.

Health Status

- ! Measures of health status were compared between those who have a current substance use problem and those who don't. Individuals with a problem *scored lower* on scales measuring mental well-being, physical pain, and health perceptions.
- ! Comparisons between those who have a current substance use problem and those who do not found *no differences* in physical, social, or role functioning, or in self-rating of general health.

STUDY LIMITATIONS

Because this was a sample of people residing in households with telephones, users most likely to have been excluded from the study include the homeless, residents of single occupancy hotels, and the institutionalized.

The low rates of reported use of cocaine, amphetamines, hallucinogens, and opiates, as compared to the 1991 National Household Survey on Drug Abuse, may reflect one or more of the following factors: the true prevalence in a general household population; a downward trend in drug use; sampling bias inherent in selecting respondents from households with telephones; and under reporting.

NOTES

1. For reliable estimates to be made for any particular subgroup, the number in that group must be of a sufficient size. The size required depends on the data and the percent responding of affirmatively to the item of interest. Oversampling was accomplished by randomly selecting more households and respondents than was required for the primary sample and then conducting full interviews, only of individuals who fell into one of the groups requiring additional respondents.
2. See Robbins, L. N., Helzer, J.E., Cottler, L. B., and Goldring, E. *NIMH Diagnostic Interview Schedule Version III Revised (DIS-III-R)*. St. Louis: Department of Psychiatry, Washington University School of Medicine, 1989.
3. For statewide analyses, the data were weighted to adjust for household size, age, gender, race/ethnicity, poverty level, and sampling region. In substate analyses, the data were weighted to adjust for household size and all strata except the one under analysis. By using several sets of weights, the power of the oversamples was preserved while adjusting for all other strata.
4. A conservative estimate because this figure only includes respondents who used a substance within the past year.
5. This percent was computed from the table for Figure 10:
$$.098 \text{ (alcohol only)} + .125 \text{ (total)} = .784.$$

—CALIFORNIA HOUSEHOLD SUBSTANCE USE SURVEY—

FIGURES

Figure 1

California

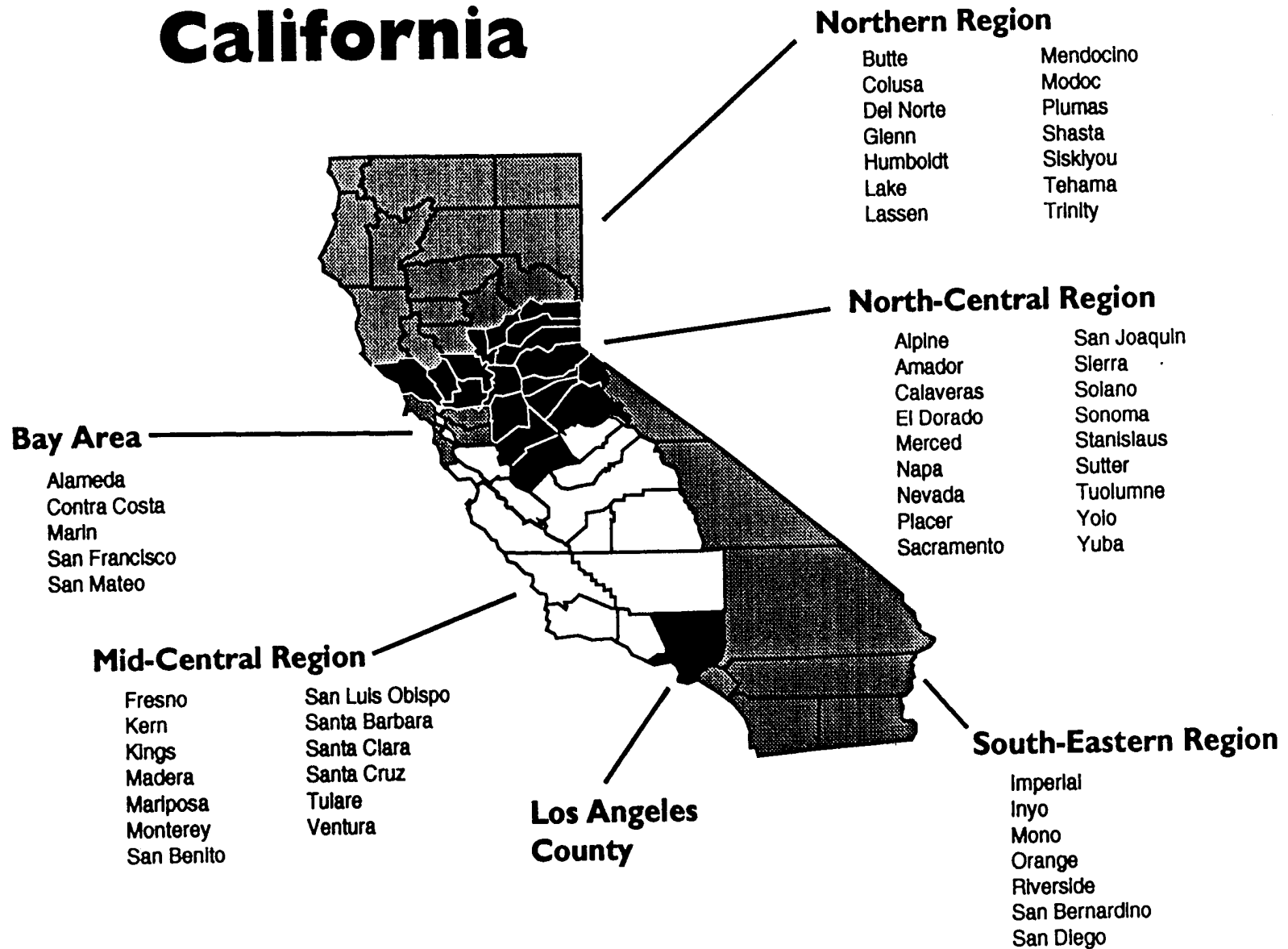
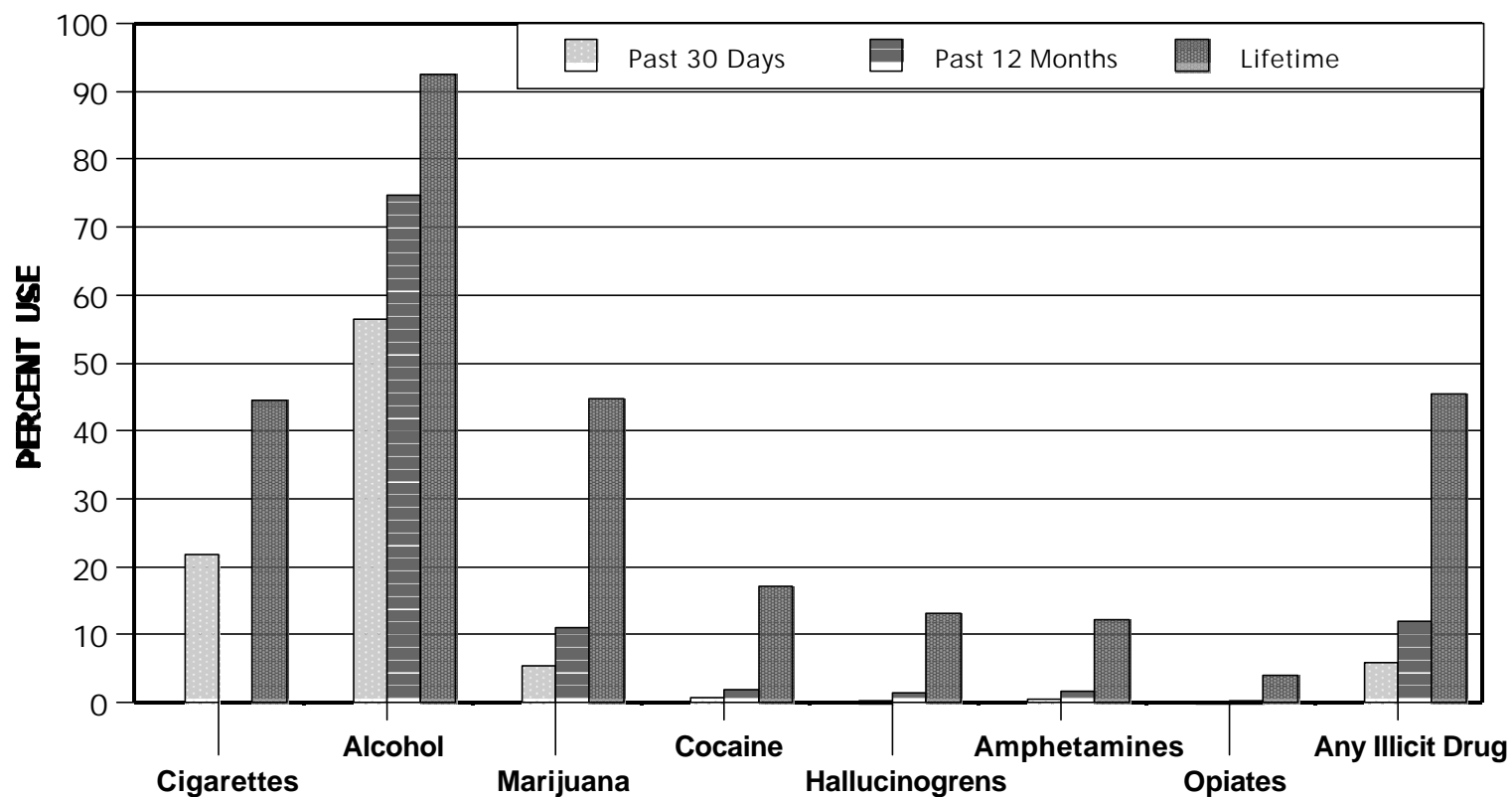


Figure 2

SUBSTANCE USE BY TIME PERIOD

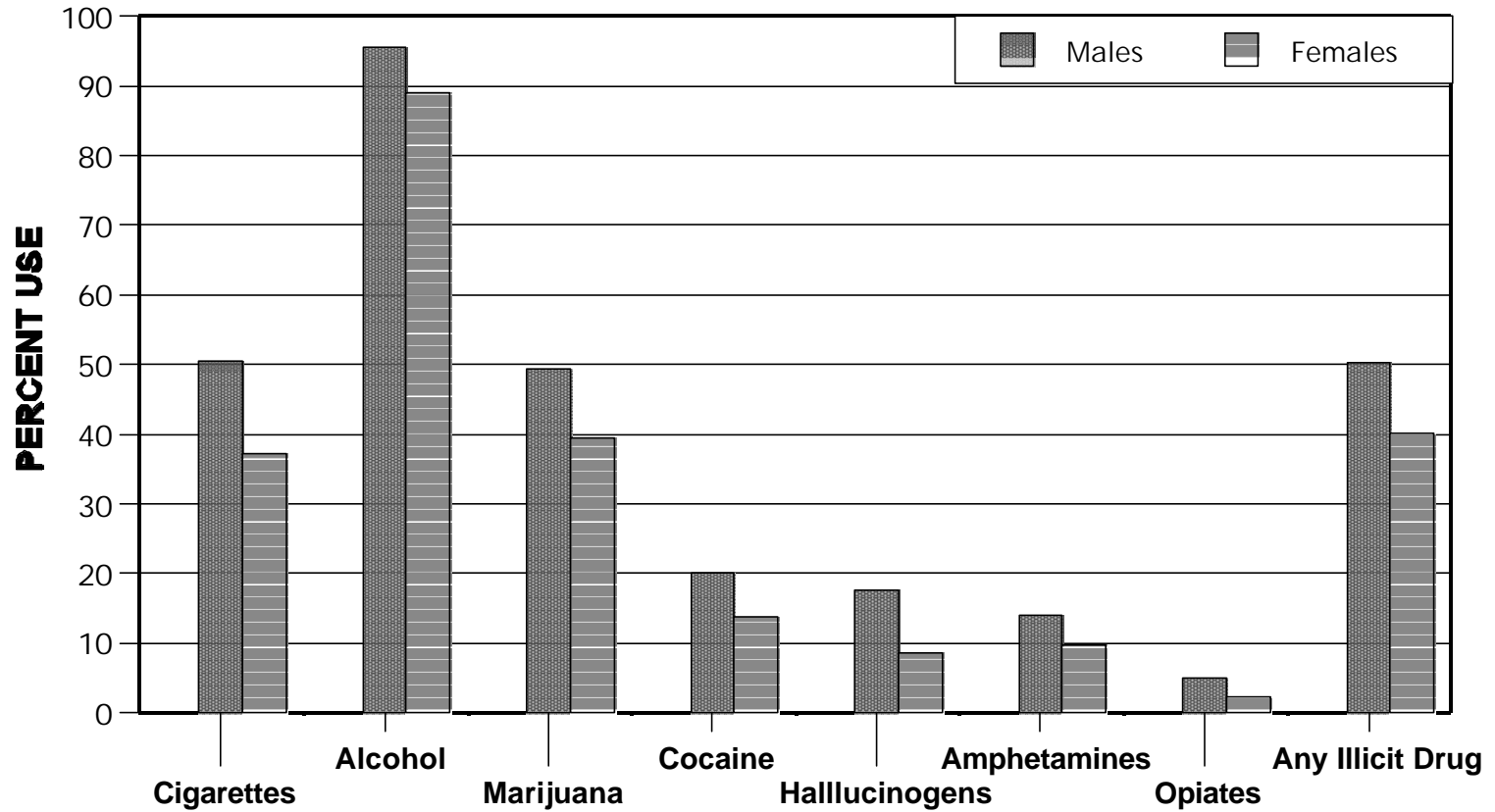
STATEWIDE



	Cigarettes	Alcohol	Marijuana	Cocaine	Hallucin.	Amphet.	Opiates	Any Illicit D.
Past 30 Day	21.7	56.4	5.5	0.8	0.2	0.4	0.1	5.9
Past 12 Mo	na	74.8	11.1	1.9	1.4	1.6	0.3	11.9
Lifetime	44.5	92.5	44.8	17.2	13.2	12.1	3.9	45.5

Figure 3

SUBSTANCE USE FOR MALES & FEMALES LIFETIME - STATEWIDE

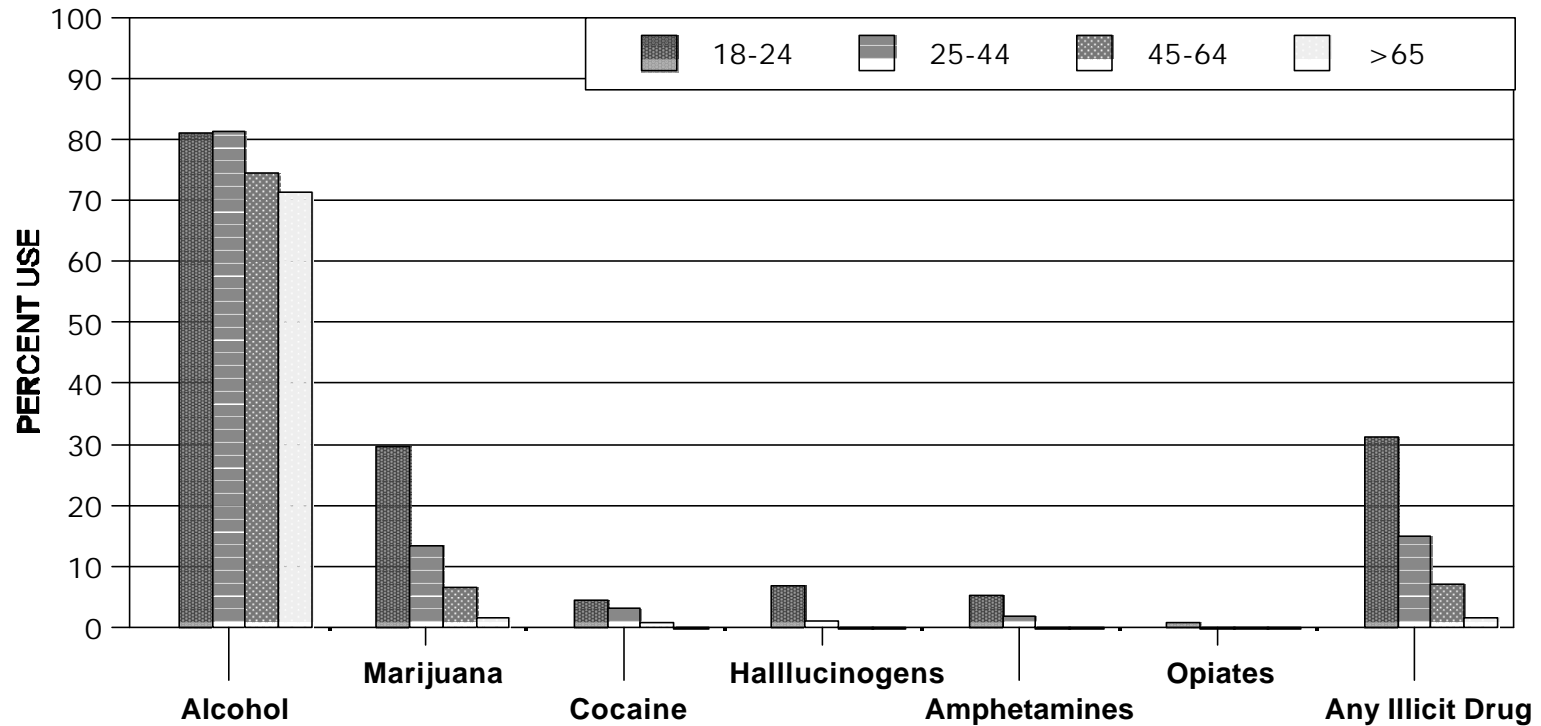


	Cigarettes	Alcohol	Marijuana	Cocaine	Hallucin	Amphet.	Opiates	Any Illicit D
Males	50.4	95.5	49.4	20.1	17.7	14.1	4.9	50.3
Females	37.3	89.1	39.4	13.9	8.7	9.8	2.4	40.1

Figure 4

SUBSTANCE USE BY AGE FOR MALES

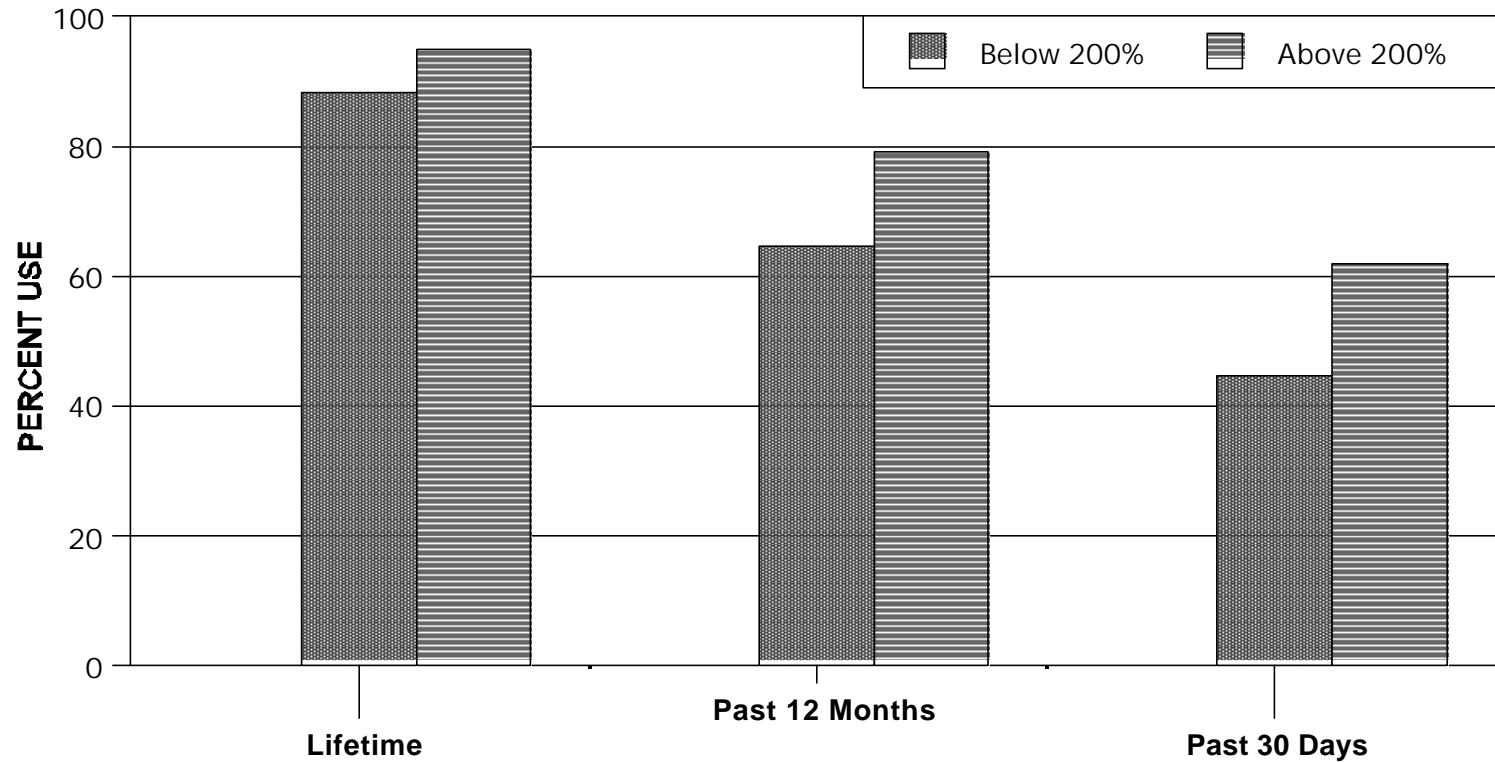
PAST 12 MONTHS



	Alcohol	Marijuana	Cocaine	Hallucinogens	Amphetamine	Opiates	Any Illicit Drug
18-24	81.1	29.7	4.4	6.9	5.3	0.8	31.2
25-44	81.3	13.4	3.1	1.0	1.9	0.0	14.8
45-64	74.5	6.6	0.8	0.0	0.0	0.0	7.1
>65	71.4	1.5	0.0	0.0	0.0	0.0	1.5

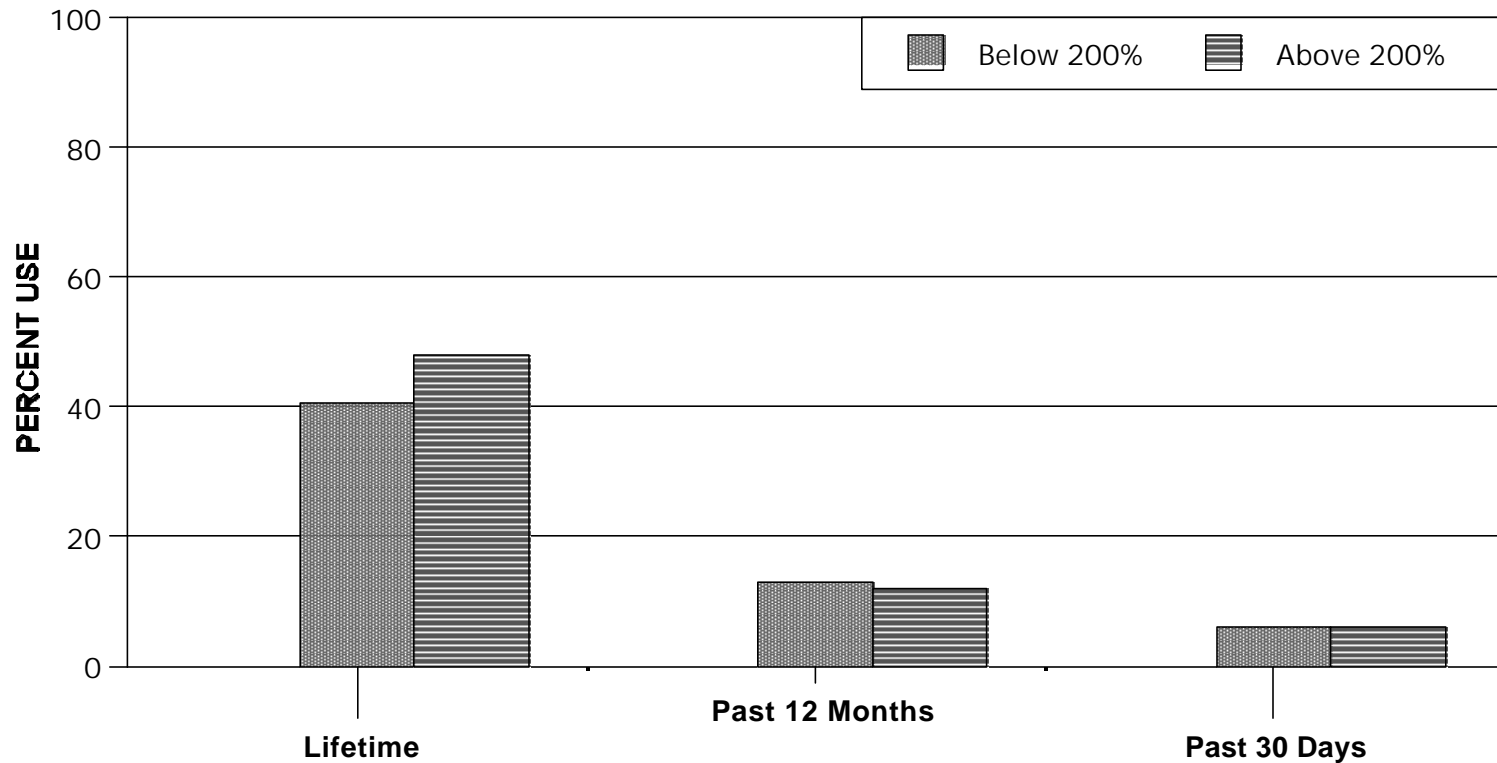
Figure 5

**ALCOHOL USE BY POVERTY LEVEL
BY TIME PERIODS**



	Lifetime	Past 12 Months	Past 30 Days
Below 200%	88.3	64.6	44.5
Above 200%	94.9	79.1	61.9

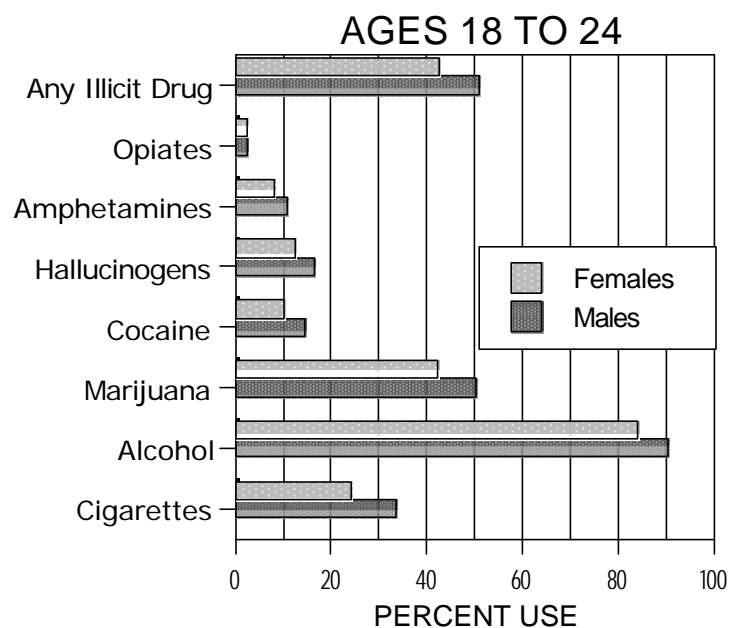
Figure 6
ANY ILLICIT DRUG USE BY POVERTY LEVEL
BY TIME PERIODS



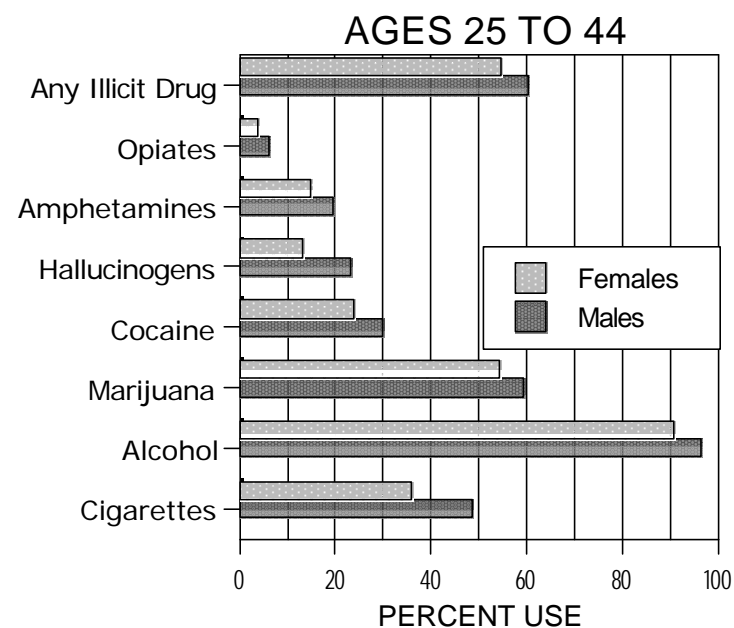
	Lifetime	Past 12 Months	Past 30 Days
Below 200%	40.5	12.9	6.1
Above 200%	47.9	11.9	6.0

Figure 7

SUBSTANCE USE BY AGE FOR MALES AND FEMALES LIFETIME - STATEWIDE



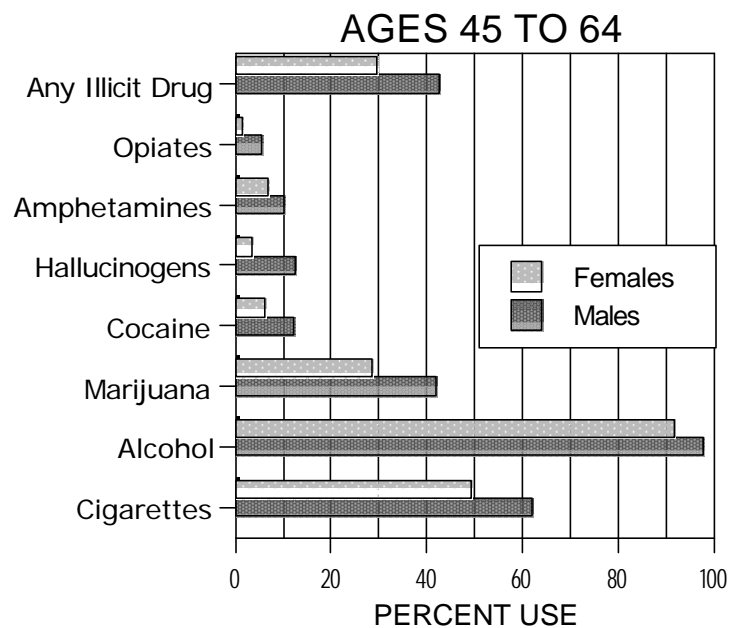
	Cig.	Alc.	Mar.	Coc.	Hal.	Am.	Op.	Any I.
Male	33.6	90.4	50.2	14.5	16.4	10.7	2.6	51.0
Fema	24.2	83.9	42.3	10.0	12.5	8.0	2.4	42.7



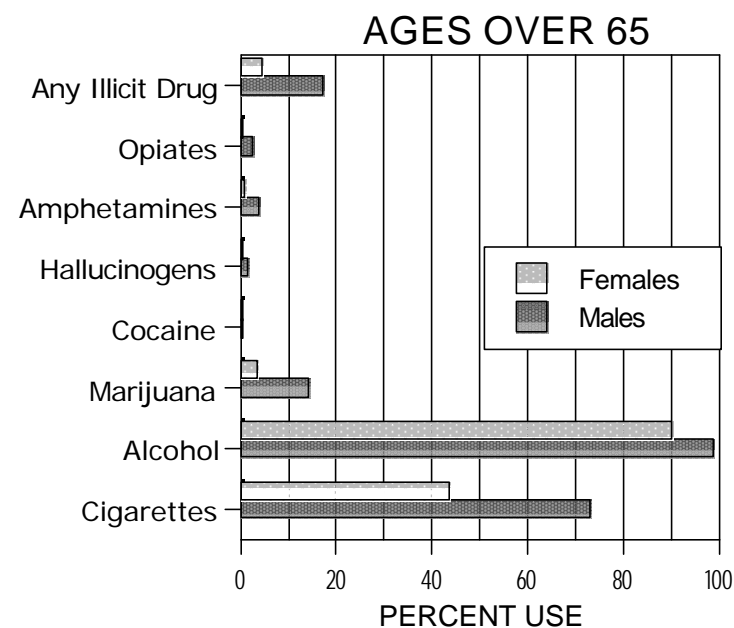
	Cig.	Alc.	Mar.	Coc.	Hal.	Am.	Op.	Any I.
Male	48.5	96.3	59.4	30.0	23.1	19.6	6.3	60.2
Fema	35.7	90.8	54.1	23.9	13.0	14.9	3.7	54.7

(Continued)

SUBSTANCE USE BY AGE FOR MALES & FEMALES LIFETIME - STATEWIDE (Continued)



	Cig.	Alc.	Mar.	Coc.	Hal.	Am.	Op.	Any I.
Male	61.9	97.6	42.0	12.2	12.4	10.0	5.4	42.4
Fema	49.2	91.7	28.6	6.0	3.3	6.8	1.6	29.5

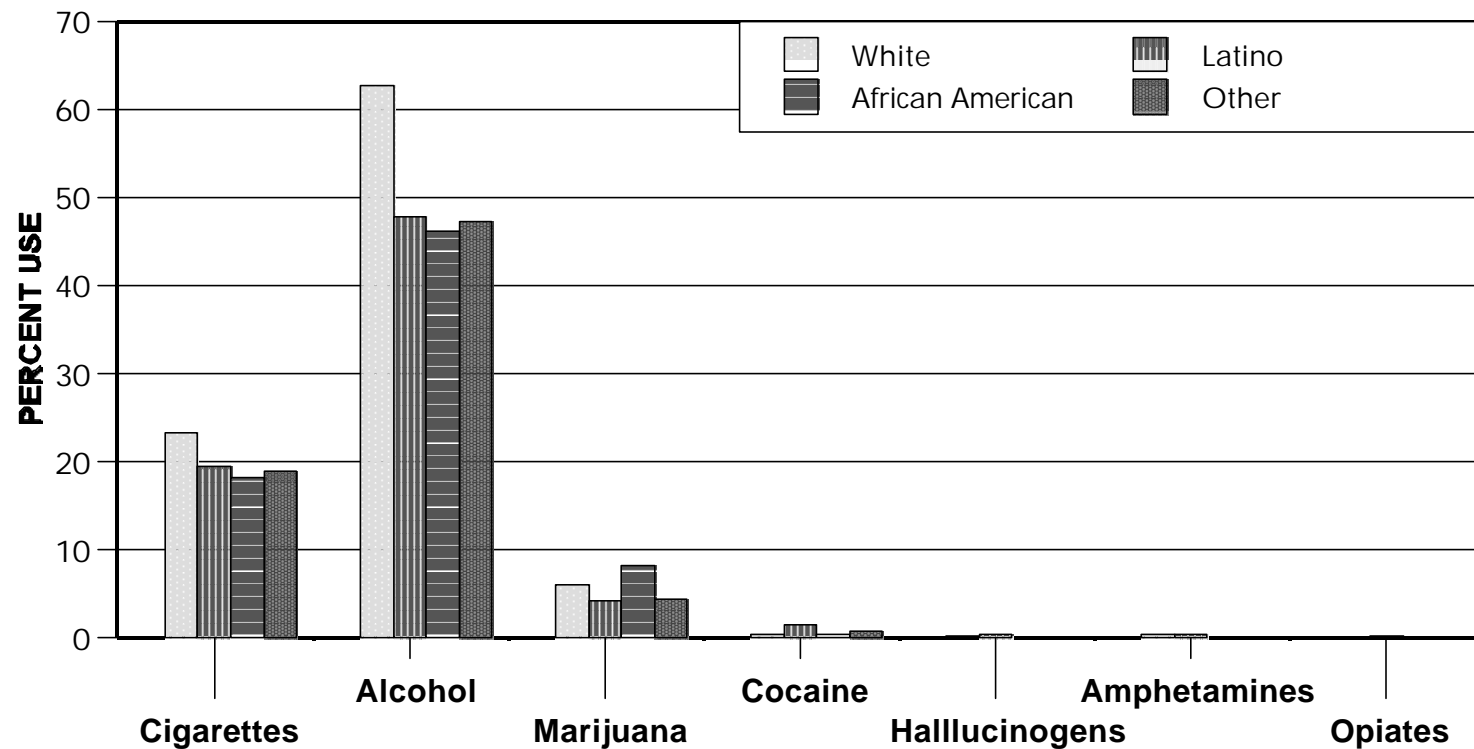


	Cig.	Alc.	Mar.	Coc.	Hal.	Am.	Op.	Any I.
Male	73	98.8	14.3	0	1.5	3.7	2.6	17.0
Fema	43.5	90.0	3.5	0	0	0.7	0	4.4

Figure 8

SUBSTANCE USE BY RACE/ETHNICITY

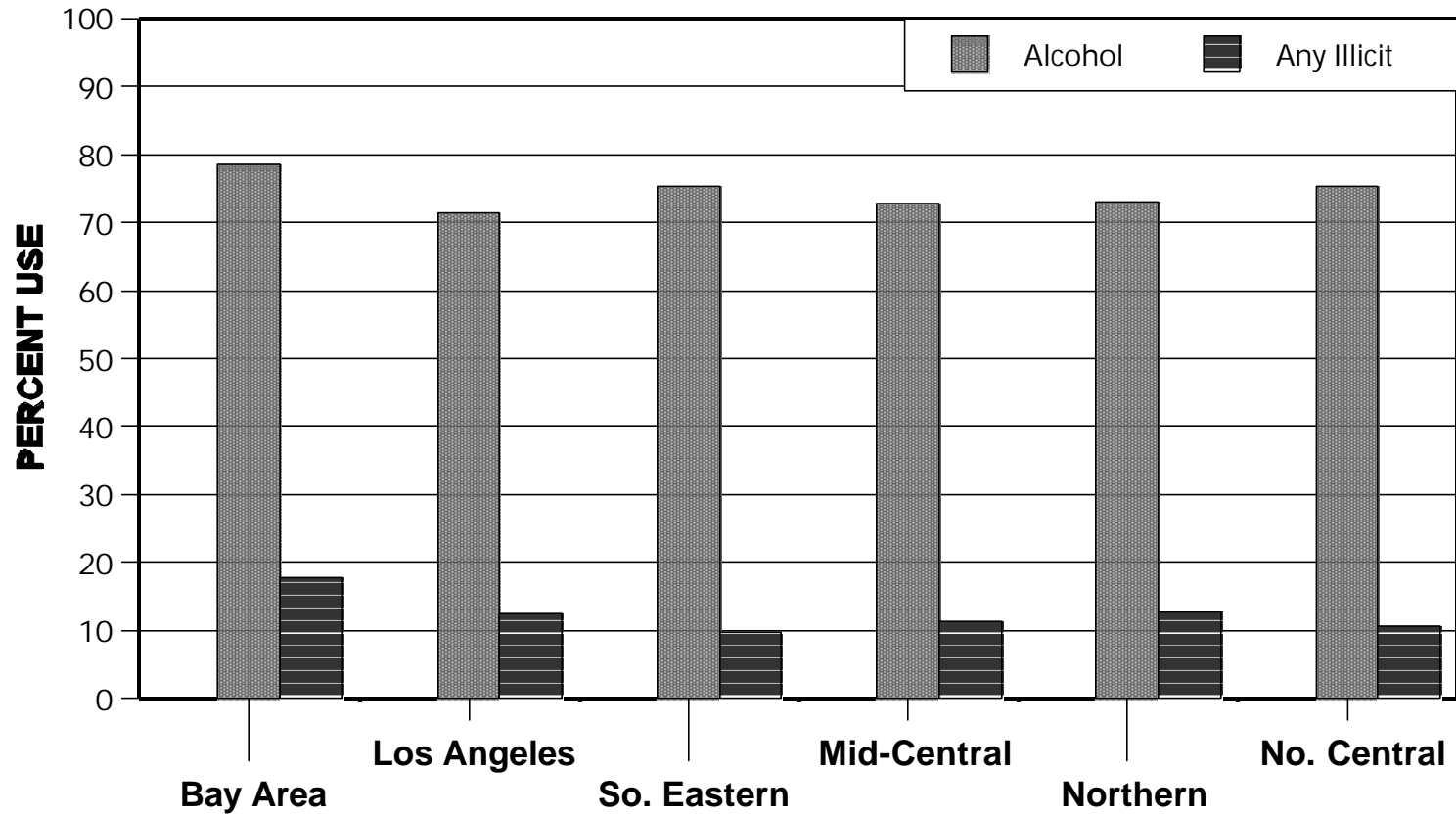
PAST 30 DAY USE



	Cigarettes	Alcohol	Marijuana	Cocaine	Hallucinogen	Amphetamine	Opiates
White	23.2	62.7	6.1	0.4	0.2	0.5	0.1
Latino	19.5	47.8	4.3	1.5	0.5	0.5	0.2
African Ameri	18.2	46.2	8.3	0.5	-----	-----	-----
Other	18.9	47.3	4.4	0.8	-----	-----	-----

Figure 9

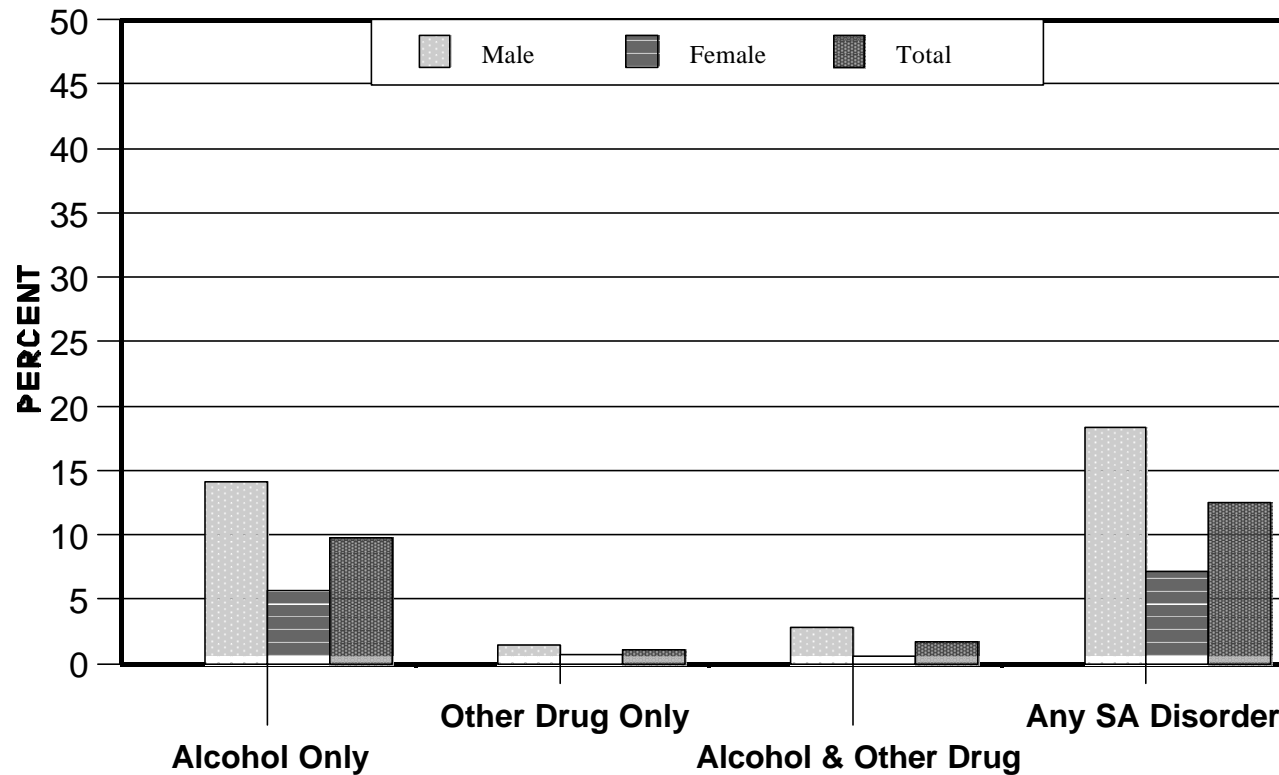
ALCOHOL AND OTHER DRUG USE BY REGION - LIFETIME



	Bay Area	Los Angeles	So. Eastern	Mid-Central	Northern	No. Central
Alcohol	78.5	71.4	75.3	72.8	72.9	75.3
Any Illicit	17.8	12.4	9.8	11.3	12.6	10.7

Figure 10

SUBSTANCE USE DISORDERS: ESTIMATES FOR MALES AND FEMALES - LIFETIME



	Alcohol Only	Other Drug Only	Alc. & Other Drug	Any SA Disorder
Male	14.1	1.5	2.8	18.3
Female	5.7	0.7	0.6	7.1
Total	9.8	1.0	1.7	12.5